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VALIDATION OF *CRATAEGUS LAURENTIANA* VAR. *DISSIMILIFOLIA* (ROSACEAE)

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ABSTRACT

The name *Crataegus laurentiana* Sargent var. *dissimilifolia* Kruschke ex J.B. Phipps is validated with explicit citation of a holotype and isotype. An epitype also is designated.

KEY WORDS: *Crataegus*, Rosaceae

For many of his new taxa of *Crataegus*, Kruschke (1965) cited under the same collection number flowering and fruiting specimens made on different dates, citing all of them merely as 'type' thus effectively treating them as 'cotypes.' These names were therefore valid under the then prevailing Montreal Code (Lanjouw et al. 1961). Such a situation is found with Kruschke's new varietal name *Crataegus laurentiana* var. *dissimilifolia* (Kruschke 1965). Earlier (Phipps 2009), I attempted to correct this by making one of Kruschke's 'cotypes' a lectotype instead of a holotype as required by Art. 9.8 of the Vienna Code (McNeill et al 2006). The Vienna Code, Art. 37.6, specified that an attempted validation of this type required the use either the term typus or holotypus or an equivalent in a modern language. Consequently, my attempted validation (Phipps 2009) failed, necessitating the present paper.

Even though my 2009 attempt to validate the name initially had been construed (by IPNI) to be a correctable error, that position was updated (IPNI 2012) to indicate that the name was not validly published. Clarification of this is found in Art. 9.9 in the Melbourne Code (McNeill & al. 2012), equivalent to Art. 9.8 in the Vienna Code; specifically, a newly added *Note 6* to Art. 9.9 illustrates that a misused type term allows correction to lectotype, neotype, and epitype, but not to holotype. Indeed, the *Crataegus laurentiana* case was cited in the Melbourne Code as an example of the new ruling (see Art. 40.6, Ex. 5).

Therefore, I correct the matter by presenting nearly identical material to that found in the earlier paper (Phipps 2009) but in which I now cite my previous lectotype as holotype as well as an isotype. I also take the opportunity to designate an epitype because flowering and fruiting material are often both required to reliably identify *Crataegus*. The types designated here thus still derive from Kruschke's cotypes of 1965.

CRATAEGUS LAURENTIANA Sargent var. **DISSIMILIFOLIA** Kruschke ex J.B. Phipps, var. nov. **TYPE: USA. Wisconsin**. Ashline Co.: Madeline Island, 1.5 mi S of La Pointe, 11 Sep 1950 [fruiting], *E.P. Kruschke E-49-145* (holotype: MILW; isotype: A). **EPITYPE** (here designated): **USA. Wisconsin**. Ashline Co.: Madeline Island, 1.5 mi S of La Pointe, 3 Jun 1949 [flowering], *E.P. Kruschke E-49-145* (MILW).

Variety *dissimilifolia* is a sporadic entity occurring in Wisconsin that is, for convenience, included in *Crataegus laurentiana*. It has white/cream anthers as in the type variety but more shallowly lobed, larger, and more nearly isodiametric leaves. A more comprehensive discussion of *C.*

laurentiana will be found in the forthcoming treatment of *Crataegus* in Flora of North America North of Mexico, Vol. 9.

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